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ABSTRACT

An overview of a comprehensive statewide plan for educational improvement in North Dakota is presented in this document. The plan prescribes an expanded leadership role for the State Department of Education and requires a vital new commitment of higher education to the problems of public education. Educational objectives of the plan are provided. Discussion includes school population trends, school personnel, school programs, instructional materials, achievement, school district organization, and school finance and support. Recommendations are offered for the state legislature, Department of Public Instruction, University of North Dakota, state colleges, and local school districts. Discussion is presented on the costs of implementing the new state programs. Related documents are RC 000 179, RC 004 196, RC 004 197, RC 004 198, and RC 004 199. (SW)

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Educational Development for North Dakota, 1967-1975

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A Product of the Statewide Study of Education

THE OVERVIEW

- PRESENT CONDITIONS
- PRESENT PROBLEMS
- DIAGNOSIS
- A STRATEGY FOR THE FUTURE
- PLANS AND PROPOSALS

RC000180

The North Dakota Statewide Study of Education

THE NORTH DAKOTA DEPARTMENT OF PUBLIC INSTRUCTION
THE NORTH DAKOTA LEGISLATIVE RESEARCH COMMITTEE 1967
THE UNIVERSITY OF NORTH DAKOTA

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Educational Development for North Dakota: 1967-1975

An Overview

A Product of the Statewide Study of Education

PUBLISHED BY THE UNIVERSITY OF NORTH DAKOTA

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PREFACE

This document contains—in highly condensed form—the elements of a comprehensive, statewide plan for educational improvement in North Dakota. The plan includes specific recommendations for (1) legislative action, (2) action by the State Department of Public Instruction, and (3) action by the State's colleges and universities. The plan prescribes an expanded leadership role for the State Department, and it requires a vital new commitment of higher education to the persistent and compelling problems of public education.

Central to the plan of action are these basic ideas for educational improvement: eight major targets; for each target, a key to the course of action that will enable North Dakota to achieve it.

(1) **Target:** Increased effectiveness of the public school system.
Key action: A damatic new program of personnel development, designed to place a qualified teacher in each classroom in the State by 1975.

(2) **Target:** Increased efficiency of the public school system.
Key action: A systematic program to reorganize local administrative units of education.

(3) **Target:** Increased equity in State financial support of the public school system.
Key action: A bold new pattern of public expenditure for education.

(4) **Target:** Increased quality of public school programs.
Key action: Elementary and secondary curriculum and instructional innovation, particularly in the State's 232 twelve-grade districts.

(5) **Target:** Renewed emphasis upon improving legislative and and administrative action programs that affect the State education system.
Key action: A comprehensive program for statewide study, planning, and evaluation as the basis.

(6) **Target:** Intensified leadership services to all levels of education.
Key action: A network of regional service centers of the Department of Public Instruction.

(7) **Target:** More effective and efficient utilization of the State's limited financial and human resources.
Key action: A new pattern of educational expenditure and a new plan of administrative organization.

(8) **Target:** Modernization of the State's educational programs.
Key action: A systematic plan for introducing modern technology into the schools and colleges of the State, and for introducing instructional innovation into classroom practice.

The comprehensive plan is designed specifically to achieve these objectives by 1975.

(1) To consolidate and focus the energies of the State's seven public colleges and universities in a dramatic new program of personnel development, research, and service, thereby to make the classroom teacher a vital part of a continuing research and improvement effort.

(2) To prepare and place 1,950 fully qualified and specifically prepared teachers into the State's elementary schools, thereby to improve the quality of education for elementary school children who otherwise would be taught by underprepared teachers (as 23,000 students now are taught.)

(3) To place each of North Dakota's 144,000 school children in a reasonably organized and administratively effective school district; each such district would contain at least 12 grades of instruction, and its high school would enroll not fewer than 200 pupils in the upper four grades.

(4) To enlarge the scope, focus and effectiveness of educational services offered by the State Department of Public Instruction, through seven regional service centers; each such center would be designed to energize and facilitate local district study, planning, evaluation, reorganiaztion, and program improvement.

(5) To upgrade the level of financial support for the normal and ordinary recurring costs of education; this requires an improved State Foundation Program that (1) equalizes inequities among local school districts and (2) enables school districts to use local tax funds more freely for program improvements over and beyond the State guaranteed minimum (for example, for public kindergartens).

(6) To shift to State Government the responsibility for the extraordinary costs of educational services: the extraordinary costs now are divided inequitably among local districts for such items as school construction, debt service, transportation, and special services for rural isolated pupils.

(7) To employ State funds to reward those local school districts that take the initiative to improve the quality and efficiency of their operations; an appropriate reward would make State aid directly proportionate to the number of fully qualified teachers that a district employs.

Appropriately implemented, this plan for action should guarantee an adequate and equal educational opportunity for every pupil, present and future, in the State education system, regardless of the pupil's place of residence in the State, and without regard to his religion, color, ethnic background, or economic status. The plan is not a static, unchanging blueprint, however. It should be refined and modified each year, on the basis of added experience and continued evaluation.

In the best sense, the plan is a guide to future action. To be most effective, the ideas and proposals herein presented will require intensive and detailed further planning on the part of the colleges

and universities, the State executive and legislative bodies, and local school districts.

Major responsibility for the plan's revision rests with the Department of Public Instruction. A permanent technical planning component should be established immediately by the Department for this purpose.

The Statewide Study Team rejects the idea that continued increases in financial support alone will improve the State educational system in any fundamental respects. Successful plan implementation depends only partly upon new levels of financial support. Success depends much more upon a disciplined reutilization and redeployment of the resources now available to the State. Additional funds will be needed from time to time, to be sure, particularly for key aspects of the personnel development program.

The ideas expressed here are deemed to be valid. Moveover, they are feasible of achievement. Now a serious and systematic review of the proposed plan should be conducted by all responsible educational agencies and institutions. Following that review, a coordinated and appropriate new program of legislative and administrative action should bring the first vital steps of the plan into reality.

* * *

The comprehensive plan for action reflects the cooperative efforts of these principal agencies. These are:

The North Dakota Department of Public Instruction

The North Dakota Legislative Research Committee

The University of North Dakota

Funds to support the statewide study, evaluation, and planning activities were provided by the State Legislature, by the Federal Government—under provisions of Title V, Elementary and Secondary Education Act of 1965—and by the University of North Dakota. Grateful acknowledgement is given to the many State and local school personnel that generously gave of their time and resources to make the study complete.

Kent G. Alm, Director
Statewide Study of Education
September, 1967

SUMMARY OF KEY FACTS: NORTH DAKOTA PUBLIC SCHOOL SYSTEM

North Dakota has made a commendable effort to support public education. Despite that effort, the State's school system is manifestly ineffective, inefficient, and inequitable in certain key respects.

North Dakota dissipates its expenditures for public education, and thereby fails to derive full benefit from its efforts. This is due to (1) an overly elaborate system of local school district organization and (2) an undue reliance upon underprepared—and therefore partly unqualified—personnel.

The focal point of attention is the State's 232 small twelve-grade districts. Districts that enroll fewer than 200 students in grades 9-12 are excessively expensive to operate. Moreover, as compared to those in larger districts, students in these small North Dakota districts are less well instructed, perform less well on achievement tests, and receive fewer scholastic program opportunities and less competent services. An estimated 7% of annual expenditure for education is lost due to the organizational structure alone; in 1966, that meant a loss of $3.65 millions. More importantly, one elementary pupil in four is instructed by an underprepared teacher; one high school pupil in three is enrolled in a borderline or substandard program.

These basic adverse conditions can be corrected in as few as eight years. Several crucial steps must be taken to accomplish this, however. Every public school pupil must reside in an accredited twelve-grade district, preferably one that enrolls no fewer than 200 pupils in the upper four grades; this means that district boundaries must be adjusted. Each well organized district must be enabled to provide a full range of needed educational services, and to employ and retain fully prepared personnel. This means that substantial changes must be made in the State Foundation Program. The colleges and universities must prepare appropriate instructional personnel, and local districts must agree to employ them.

Fortunately, the school population will remain relatively constant during the next decade. This means that the State can concentrate its efforts on achieving excellence in its public schools and not on sheer expansion of the school system. It is also fortunate that there no longer are geographic barriers to substantial reorganization. At least 90% of all pupils now enrolled in public schools reside within a reasonable commuting distance of a district that now enrolls 150 or more students in the high school.

The Statewide Study Team has formulated a plan of action. It provides an attractive and feasible means for correcting major flaws in the present system. Each citizen of the State is encouraged to inform himself of the current realities and of the exciting new possibilities for educational improvement.

The essential facts are these:

School Population

* In 1965-66, North Dakota enrolled 144,324 pupils in grades 1-12. Only 2,661 kindergarten pupils (approximately 22% of five year olds who might have been enrolled) were enrolled in that year.

* During the next decade, the school population is expected to decline slightly. The enrollment in grades 1-12 estimated for 1975 is about 140,000. By 1980, however, enrollments in grades 1-12 should increase to 143,000 or more A public school kindergarten program could add 12,500 in that year.
* The relatively stable public school enrollment grants North Dakota an unusual opportunity for the next decade. It will enable the State to concentrate its attention upon improvement in the quality of education, and to center its efforts upon appropriate improvements in school program, personnel, and organization.

School Personnel

* **ELEMENTARY TEACHERS**
  * North Dakota ranks 50th among the states in the matter of the professional preparation of its elementary school teachers. The majority of the State's 4,537 elementary teachers are not adequately prepared; only 1,853 teachers (40.8% of the total) hold a college degree.
  * Of those now employed, 1,832 elementary teachers have not yet completed even three years of appropriate college preparation; 852 other teachers have completed three years or more, but have not yet earned the essential degree.
  * The underprepared elementary teachers are not progressing satisfactorily toward completion of their degrees. Half of them have not added to their original preparation during the past five years. The average teacher who did return to college study completed only about one course per year. At this rate, the 2,500 non-degree teachers would require from 10 to 20 years to complete their basic college preparation. Their average age now is 43. Starting at that age, if they continue to study at their present rate, North Dakota would not economically achieve a qualified elementary teaching force in this generation.
  * By 1975, the State needs to prepare no fewer than 1,950 fully qualified elementary teachers, to employ them, and to place them in the rural villages of the State where most non-degree teachers presently are employed.
  * The State's preparatory institutions need to develop dramatically new preparation programs to meet this need. Present programs are not fully adequate. For example: 40% of the University of North Dakota's education graduates leave the State; of those who enter teaching in the State, nearly 90% are employed by a single urban school district.
  * A new personnel preparation and deployment program—initiated in 1968 and sustained through 1975—could project North Dakota to the forefront of the states, as measured by elementary teacher qualifications.
* **HIGH SCHOOL TEACHERS**
  * Nearly all of the 2,465 high school teachers in North Dakota have completed a college preparation program; however, the State also ranks 50th among the states in high school

teacher preparation, because a scant 13% of the present teachers have completed a masters degree program—the desired minimum—in their major field of study.

* Secondary teachers continue their advanced preparation at the rate of approximately one course per year. By accelerating this rate among selected teachers, it would be possible to increase the proportion of masters degree teachers from 13% to 50% by 1975.

* However, only 1,383 high school teachers (56.1% of the State's total) devote themselves exclusively to high school teaching. The other 1,082 professional persons only teach part-time in high school, principally in small twelve-grade districts. Frequently they also are employed as superintendents, principals, librarians, counselors, and elementary teachers.

* **EDUCATIONAL SERVICE PERSONNEL**

  * The State lacks key educational service personnel, even among the largest urban school districts.

  * **School librarians** are in short supply. 284 full time librarians are needed. Only 202 are now employed—mostly part-time—and even these have completed less than 50% of required preparation in the library sciences. An intensive summer school institute program would correct this condition by 1975.

  * **High school counselors** now provide essentially part-time services to 16,500 of the State's 44,466 high school students; for nearly two-thirds of the high school population, the schools offer no access to qualified academic and vocational counseling services. Ninety-two additional full-time counselors are required by 1975. Expanded full-time university programs will be required for this task.

  * **Teachers for the educationally handicapped** are virtually non-existent. Elementary pupils with physical, mental, or emotional handicaps require 199 special education teachers by 1975; an additional 85 teachers are needed at the high school level for this purpose.

  * Except in the largest districts, **elementary administrators and supervisors** are generally part-time. Moreover, they are underprepared for their leadership responsibilities. Only 68 of the State's 261 principals qualify for State certification; and 58 of those who do qualify are employed by the 11 school districts of the State that enroll 1,750 or more children. By 1975, the State will need to prepare and employ 259 qualified, full-time elementary administrators and supervisors. Special graduate level externship programs will be required for this purpose.

  * **Secondary administrators and supervisors,** as a group, are even less well prepared than those in the elementary schools. There are only 38 fully qualified high school principals in the State. An additional 201 persons hold part-time positions as high school administrators, but are not qualified to do so, in accordance with minimum certi-

fication standards. By 1975, the State needs to prepare and employ no fewer than 109 full-time qualified secondary school administrators. New and expanded graduate programs will be needed for this task.

* School superintendents are among the best prepared professional personnel in the State. Of the 289 persons now employed full or part-time as district superintendents, 196, or 67.8%, hold the masters degree and thereby meet minimum certification standards. By 1975, the State needs to upgrade the preparation of most of the superintendents and other general administrators now in service, and to prepare and employ no fewer than 40 additional new administrators with even higher levels of professional preparation. Appropriate expansion and refinement of advanced graduate programs in administration will be required.

School Programs

* **ELEMENTARY SCHOOLS**
  * North Dakota ranks 50th among the States in overall opportunities for elementary education. There is ample evidence that kindergarten programs add substantially to success later in school, particularly among rural children; nevertheless, only 2,804 kindergartners—principally urban residents—were enrolled in 1966-67. At least 12,500 might have been enrolled if public kindergartens were available Statewide.
  * Moreover, the quality of opportunities for elementary pupils in grades 1-8 is limited. Nearly 23,000 elementary children are instructed solely by non-degree teachers. Most of these reside in small twelve-grade districts. Their later achievement at the high school level will be markedly and negatively affected by this practice.
  * At least one full-time elementary teacher in five must teach at two or more grade levels, as a result, those teachers face the extremely difficult task of teaching six or seven different subjects at each of two or more levels of instruction. Children in their classes receive less individual attention than they should, and the reduced quality of their elementary school instruction is reflected in the lower levels of achievement in their high school studies.
  * All teaching in one-room rural schools occurs in combination classes. Over one-half of the teachers in the graded elementary districts instruct in combined grades. However, less than four precent of those who are employed in Type I, accredited twelve-grade districts, instruct in combination classes.
  * The number of undesirable combination classes should and can be substantially reduced in North Dakota; to do so, however, the State must consider and implement a plan of thorough district reorganization.
* **SECONDARY SCHOOLS**
  * The typical high school in North Dakota enrolls fewer than

90 students in grades 9-12, and employs an average of only five or six teachers. The high school faculty typically offers 26-27 courses per year, an average of about seven courses per grade. Because of these limited offerings, the typical high school student in North Dakota is required to enroll in a single, unvaried course of study.

* Students in most high schools receive instruction in English, social studies (history, civics), and some aspects of business. Most also receive courses in mathematics and science, although the number and diversity of these offerings are limited. Few schools provide adequate opportunities for study of foreign language. vocational-technical areas, or advanced work in any major field of study except English.
* 117 of the State's 278 twelve-grade districts offer fewer than 26 units of high school credit per year. About 22,900, or 53.7% of all high school students, are enrolled in such marginal or substandard school programs.
* To provide for individual differences among their high school students, any large and well organized school district in the United States, including the few such districts in North Dakota, will offer three to four times the number of opportunities as the typical high school in North Dakota, and usually at less cost.
* Nevertheless, the State does operate some very fine high school programs. The average number of courses available in the six largest school districts, for example, is 71 each year. One district offers 80 courses. In these districts, the student has an opportunity, in planning his individualized program, to choose among 18 or more different courses at each grade level.
* The minimum size of district which the State may most effectively strive to attain is the Type I, accredited twelve-grade district. Such districts enroll 215 students or more in the upper four grades; an average of at least 37-40 courses per year may be offered economically, and at least 12-13 full-time teachers may be employed efficiently.
* In small districts, certificated high school teachers typically find it necessary to teach some courses for which they are either unqualified or minimally prepared. 2,465 persons were employed in 1966 as high school teachers; 1,302 or more than half were assigned to teach courses in two or more fields of specialization. Only 47.2% taught solely or principally in their major field of competency; this is the desired practice. Seven percent of the teachers were assigned to teach in as many as four different fields of major; that task is beyond the capabilities of all but the most accomplished scholar. An additional 12% were assigned to teach in three different fields of major. Such combination teaching affected 18,000 high school students (44.4% of the total) in 1966.
* By 1975, it is possible to enroll the vast majority of the State's high school students in at least a Type I accredited program. To do so, however, the State must vigorously

pursue a new policy for local district organization: place each pupil in a twelve-grade district that enrolls no fewer than 200 students in the upper four grades.

* **INSTRUCTIONAL MATERIALS**
  * Significant steps were taken between 1965 and 1966 to provide adequate instructional materials for elementary and secondary pupils. However, the levels of financial support remain inadequate for essential instruction supplies, aids, and materials.
  * The typical elementary teacher in 1965-66 had $54 to spend for library and audio-visual materials for her classroom. High school teachers—where courses are more diversified and expensive to operate—had $120. These amounts are barely adequate to replace antiquated or worn-out volumes and materials.
  * A similar situation exists with respect to textbooks and supplementary readers. In rural schools and graded elementary school districts, the typical teacher had but $162 in 1965-66 for a class of 18 pupils. In twelve-grade districts, the elementary teacher had $138 for a classroom of 23 children. At the high school level, average allocations for purchase of textbooks and supplementary readers were even less. The typical class of 20 students received $120 for essential references and supplementary materials, an average of but two to three volumes per student.
  * By 1975, the number and variety of instructional supplies, aids, and materials, must be substantially increased. An expenditure level of $25 per pupil should be considered as a minimum target.

* **ACHIEVEMENT**
  * Contrary to popular conviction, students in the State's small school districts do not—on the average—perform as well as students in large school districts on standard tests of academic achievement.
  * In 1966, 16,500 ninth and eleventh grade students—43% of all the State's high school students—were tested in eight significant areas of academic achievement. Test scores at the ninth grade level reflected the pupils' earlier elementary school preparation, of course, since they had been enrolled in high school only for one month; high school studies would not yet have affected their test scores. Test scores of 11th graders fairly reflected two years of high school experience.
  * Ninth graders' composite scores on all tests were significantly lower in schools enrolling fewer than 200 students in the upper four grades; only one small school (22 students) was an exception to the rule. The best average scores were achieved in districts that enrolled 500 or more students in grades 9-12.
  * Similar test results were obtained from 11th grade students. With one exception, scores of students were significantly lower in those districts that enrolled fewer than

200 students in grades 9-12. The best average scores were achieved by students in twelve-grade districts that enrolled more than 1,000 students in the upper four grades.

* It is the intent of the State's educational system that opportunities for successful academic achievement are to be equalized for all high school students in the State. To provide equal opportunity, it now seems that every high school student must be enabled to participate in the programs of a reasonably large twelve-grade district: a district that enrolls no fewer than 200 students in grades 9-12.

School District Organization

* The State's 144,324 pupils are enrolled in 529 relatively autonomous local school districts. Each district—through its local school board and professional staff—determines the curriculum (with limited exceptions as directed by the State Legislature) as well as the quality of opportunities to be guaranteed each child.
* Districts vary, in size of enrollment and in local ability to support school programs. In 1965-66:
  * 74 districts operated no school programs at all.
  * 168 districts only provided one-room elementary schools; their combined enrollment was 2,392, or 1.6% of all pupils enrolled in grades 1-12.
  * 81 additional districts only provided grades 1-8. These districts enrolled 5,539 elementary pupils, or 3.8% of all pupils enrolled in grades 1-12.
  * These 323 districts (74 non-operating, plus 168 rural one-room, plus 81 offering grades 1-8) transported their youngsters of high school age to twelve-grade districts elsewhere.
  * 9,096 pupils were enrolled in 67 non-accredited twelve-grade districts; they represent 6.2% of the total 1965-66 State enrollment in grades 1-12 These districts enrolled 2,822 high school students, 6.6% of the State's high school total of 42,781.
  * The vast majority of the State's pupils were enrolled in 211 State accredited twelve-grade districts; their aggregate enrollment during 1965-66 in grades 1-12 was 129,127 or 88.3% of the total State enrollment.
  * The typical twelve-grade district enrolls fewer than 300 students; however,
    * 94,279 students—64.5% of all pupils in North Dakota public schools—were enrolled in just 74 districts. Thus 64.5% of total enrollment is accommodated in only 14% of the State's 529 operating districts; these are the districts that enroll at least 150 pupils in grades 9-12, and typically qualify either as Type I or Type II acredited twelve-grade districts.
    * Only 35.5% of the State's pupils are not now enrolled in a Type I or Type II district.

* MOST IMPORTANTLY, 90% or more of the State's pupils live within reasonable commuting distance (i.e., 20 miles) of a twelve-grade district that now enrolls no fewer than 150 pupils in the upper four grades.

* Contrary to public opinion, there now are no major geographic barriers to substantial local district reorganization.

* 90% or more of the State's pupils could be enrolled tomorrow in a Type I accredited twelve-grade district without involving either (1) unreasonable increases in transportation costs to the State, or (2) unfair financial disadvantages to the citizens in those districts.

* The remaining ten percent of the pupils can be reached through appropriate special service programs; such programs would equalize their educational opportunities with those pupils who now reside in the districts that offer satisfactory programs. Special service programs carry costs that are higher than normal, to be sure, but they can provide suitable educational opportunity to the one youngster in ten who resides in truly isolated sections of the State; present arrangements cannot do so.

* The present pattern of district organization is unnecessarily elaborate. The pattern persists despite the fact that pupils no longer are as isolated as before from natural and potentially more effective and efficient school centers. Moreover, it perpetuates ineffective and inefficient school programs and practices:

* The percent of non-degree teachers is much higher among small districts; for example: 93% of one-room rural school teachers are underprepared; 86% of the teachers in graded elementary districts are underprepared, and so are 80.3% in small twelve-grade districts. By contrast, less than 43% of the elementary teachers in twelve-grade districts that enroll 200 or more pupils in the upper four grades are underprepared. In the six largest districts in the State, less than 20% of the elementary teachers lack degrees.

* The presence of the non-degree teacher is small districts accounts—in largest part—for the relatively low average of academic achievement by pupils in those districts.

* Full and varied study opportunities are lacking in the 232 small high school districts; this fact contributes in large part to the relatively low average of academic achievement among high school students of those districts. The relatively low average of achievement is caused also by the districts' practice of assigning teachers to instruct in areas in which they are not fully qualified; that practice, of course, is virtually forced upon the small districts by the very fact that they are too small to employ complete staffs.

* In summary, the chief educational offender in the present school organization is the small twelve-grade district. The educational output of the small district is comparatively low. Moreover, as indicated elsewhere, instruction costs

in those districts are inordinately high. Hence, the State—and the local district—invests more money in its small rural elementary and twelve-grade districts than in any others, but receives less educational benefits from them.

* By 1975, the State could markedly improve the school personnel and program situation, simply by placing every child in a Type I accredited twelve-grade district. With that one change, the people of the State can conserve substantial sums of the present financial investment in education; at the same time, they will improve their educational programs and services as well. A sensible plan of district reorganization—to put every child in a Type I accredited twelve-grade district—merits wide support.

School Finance

* **LEVEL OF EXPENDITURE**
  * $n 1965-66 North Dakota expended approximately $544 per pupil for public education.
  * Of that total, $427 was expended for instructional and related operating costs (exclusive of transportation, capital expansion, and bonded indebtedness).
  * About $41 per pupil was expended for transportation services. (Not all pupils are transported, of course; this cost represents about $106 per transported pupil).
  * Approximately $76 per pupil was expended to pay principal and interest on bonds, and for other direct costs of capital expansion (land, buildings and equipment).
  * At this level of expenditure, the State was able to support an average teacher salary of about $5,100, nearly $1,500 below that of the national average in that year. (The average salary was pulled down by the number of non-degree teachers, whose salaries average about $4,600.)
* **SOURCES OF FUNDING**
  * Local school districts provided the largest share of funds available for education in 1965-66.
  * Local district property valuation was about $688.3 millions for tax purposes. The average local tax levy in the State was 57.5 mills and produced approximately 39.6 millions of local revnue.
  * State and county taxes, and other State revenue sources added approximately $34.5 millions.
  * The Federal Government provided $5.67 millions.
  * The total expenditure for the year ending June 30, 1966, was approximately $79.8 millions, exclusive of the expenditure of funds borrowed for the construction of facilities, etc.
  * Local support represented about 50% of total current expenditures in that year; State, County, and Federal funds provided the balance, with Federal support slightly in excess of 7%.

* **LOCAL ABILITY**
  * In 1965-66, local property was assessed for school tax purposes at an average $4,700 per pupil enrolled in grades 1-12. Each pupil was supported locally at an average rate of 57.5 mills, or $270.25 per enrolled pupil.
  * These levels of local valuation are manifestly low; moreover, they are unequally distributed throughout the State. Average local valuation was distributed as follows:
    * One-Room Rural Districts: $13,152 per enrolled pupil
    * Graded Elementary Districts: $ 8,890 per enrolled pupil
    * Non-Accredited 12-Grade: $ 5,632 per enrolled pupil
    * Accredited 12-Grade: $ 4,341 per enrolled pupil
  * Clearly, the districts that carry the greatest share of the burden for education in the State—that is, the accredited twelve-grade districts—are least able to provide essential local financial support for education.
  * The point is made most vividly in the State's six largest school districts, where the average local valuation is only $3,442 per enrolled pupil.
  * Tuition payments for pupils enrolled from other districts do not fully compensate for these differences in local tax ability.
  * When per pupil valuations in rural and graded elementary districts are corrected to account for the number of pupils sent to other districts, their basic valuations per pupil (grades 1-12) still exceed those of twelve-grade districts.
    * One-Room Rural Districts: $9,223 per resident pupil
    * Grade Elementary Districts: $6,255 per resident pupil
    * Non-Accredited 12-Grade: $5,632 per enrolled pupil
    * Accredited 12-Grade: $4,341 per enrolled pupil

* **LOCAL EFFORT**
  * North Dakota ranks 13th among the States when its current expenditure for education is compared to personal income of the State's residents.
  * In 1964-65, North Dakota was reported by the National Education Association to have expended 4.2% of aggregate personal income for education. Of its near neighbors, only South Dakota (5%), Montana (5%), and Minnesota (4.7%), made greater effort to support education, by this measure.
  * Local effort varies markedly among the districts of the State, however. In the 74 non-operating school districts, the average levy in 1965-66 was only 29.49 mills; the average for the State in that year was 57.5 mills. Graded elementary districts levied an average of 47.2 mills; rural one-room districts levied only 34.2 mills, and non-accredited twelve-grade districts, 51.12 mills.
  * The greatest effort was made by citizens in accredited twelve-grade districts, where average property valuations are typically lower, yet quality of programs and qualifica-

tions of instructional personnel are higher. The 211 State accredited twelve-grade districts levied an average 60.88 mills in 1965-66.

* The burden on property taxes to support education in North Dakota manifestly is too high. There is very little leeway left for many local districts if they wish to go significantly beyond present levels of expenditure in order to achieve needed improvements in school program and personnel.

* In order to reduce local levies, the State therefore is forced to look for significant economies in its pattern of local district organization. As indicated later, over $7.6 millions could be released annually from present local levies if the State were to reorganize its small local districts into Type I accredited districts. At the same time that this is accomplished, North Dakota could systematically and materially improve the quality of programs and personnel in the schools.

* COST OF EDUCATION AND DISTRICT ORGANIZATION

* The small district in North Dakota is not only educationally ineffective and inefficient it is also expensive to maintain.

* Per pupil costs in 1965-66 in North Dakota (exclusive of transportation and capital outlay) were as follows:

  * One-Room Rural Districts: $486.97
  * Graded Elementary Districts: $409.42
  * Non-Accredited 12-Grade: $450.15
  * Accredited 12-Grade: $424.95

* The rural and graded elementary districts expended nearly as much as the twelve-grade districts—or even more—despite the fact that they did not fully support more costly high school instruction or capital construction.

* The 67 small non-accredited twelve-grade districts expended $25 more per pupil in 1965-66 than the State accredited districts yet they employed significantly more non-degree teachers, and they provided less extensive programs and fewer services to their pupils.

* The impact of size of district upon operating cost is even more apparent in the table found on the following page.

* Cost per pupil may be seen to decline significantly as size of district increases; costs are lowest where the enrollment level is highest and where districts significantly improve the quality of their personnel, programs, and services (i.e., in districts that enroll 500 or more pupils in grades 9-12).

* Had each pupil been enrolled in a Type I accredited district in 1965-66, the State could have saved at least $25 per pupil in operation costs alone, an aggregate savings of approximately $3.65 millions, or about 7% on the total investment in education in that year.

* Additional financial investments in education—if the pres-

ent organizational structure is retained—will further aggravate the situation and lead to the dissipation of still more moneys, because the small districts—which yield a disproportionately low share of educational benefit—typically receive a disproportionately high share of State financial aid.

* The State legislature added $11 million to the State Foundation Program for the 1967-68 biennium. The investment will not produce all of the desired effects; at least 7%, or $770,000, will be dissipated outright, due to the elaborate organization. Moreover, merely to increase State expenditures in the schools will not increase the number of qualified personnel employed or available for employment, and cannot increase the number and diversity of programs offered in the schools with limited enrollment. The added increment of dollars would add to the total expenditure per pupil but would not necessarily add to the quality of educational opportunities in small districts.

Type of District	No. of Districts*	Aggregate Enrollment* (1-12)	Current Expenditure Per pupil** (In dollars/pupil)
One-Room Rural	**(168)**	**(2,392)**	**(486.97)**
Graded Elementary	**(81)**	**(5,539)**	**(409.42)**
1- 49 pupils (1-8)	47	1,443	471.84
50- 99	20	1,320	370.57
100-199	10	1,330	364.75
200/more	4	1,446	424.11
Non-Accredited 12-Grade Districts	**(67)**	**(9,096)**	**(450.15)**
1- 24 pupils (9-12)	6	479	541.24
25- 49	47	5,631	488.66
50- 74	9	1,610	931.86
75- 99	4	914	450.16
100-149	1	462	520.16
Accredited 12-Grade Districts	**(211)**	**(129,127)**	**(424.95)**
1- 24 pupils (9-12)	1	105	532.78
25- 49	15	2,047	517.03
50- 74	39	7,435	463.34
75- 99	45	11,764	451.48
100-149	37	13,379	402.53
150-199	28	15,342	394.14
200-299	24	15,991	392.80
300-399	9	8,628	392.05
400-499	2	3,446	332.26
500-599	5	8,729	393.10
100/more	6	42,161	436.32
ALL DISTRICTS			**(426.62)**

*Totals in parenthesis.

**Exclusive of transportation and capital expenditure.

FINDINGS

A Diagnosis

MORE MONEY IS NOT THE ANSWER

* North Dakota's substantial effort to support public education is largely dissipated due to (1) an overly elaborate system of local school district organization and (2) a persistent reliance upon underprepared instructional personnel.
* Despite public policy to the contrary, the pupil's level of educational attainment is predetermined by his place of residence—which should be entirely irrelevant—rather than by his ability, motivation, or interest.
* Additional expenditures of local, State, or Federal moneys will not materially change this condition, unless and until the State embraces and vigorously pursues reasonable plans of local district reorganization and personnel development.
* The focal point of concern is the small twelve-grade district. Districts that enroll fewer than 750 students in the high school are expensive to operate; districts that enroll fewer than 200 students in grades 9-12 are excessively expensive. Moreover, in North Dakota, students in the small schools typically receive instruction that is less than satisfactory, typically reach a level of achievement that is less than gratifying, and typically have access to an insufficient variety of educational opportunities and an inadequate set of educational services.

GEOGRAPHY IS NOT A PROBLEM

* The State need not wait in the matter of reorganization. Ninety percent or more of the State's public school pupils now reside within commuting distance of a Type I or Type II twelve-grade district; hence, there no longer are any insurmountable geographic barriers to more economical and effective patterns of district organization.
* Given an efficient pattern of local district organization, the State Government would be enabled to supply an increasing share of the total financial support for education. The State Government could do so within the limits of present resources, and the reconstituted local school districts would again have the appropriate and desired leeway to act on taxation for education.

STRUCTURE AND STAFF

* Before the State Government significantly increases its support of elementary and secondary education in the future, it should first get its local organizational structure in order. Future State assistance to local school districts should be contingent largely upon their demonstrated willingness (a) to reorganize into efficient units, and (b) to employ fully qualified professional personnel.
* Appropriate incentives should be provided to encourage and eccelerate the necessary reorganization of the State's present 600 school districts.

* District reorganization alone will not yield all needed improvements in public education. It is the first critical step, however, and it is a prerequisite for other actions.

TRAINING AND SERVICES

* The State colleges and universities should assume primary responsibility to prepare appropriate new kinds of elementary teachers and other needed professional personnel; local districts—once properly organized—should agree to employ and retain them. Salary levels for teachers and related qualified personnel must necesarily be adjusted upwards; and the colleges and universities will require special assistance—from both State and Federal sources—for their extraordinary effort in this regard.
* The State Department of Public Instruction should be equipped to energize and facilitate the orderly reorganization of local districts, and to develop and extend appropriate services to pupils in isolated areas.
* In summary, the basic condition of the North Dakota system of education is demonstrably ineffective, inefficient, and inequitable. Two major factors inadvertently discriminate against a sizable plurality of the State's children and youth: (a) the pattern of district organization, and (b) the unbalanced distribution of qualified personnel and school programs and services.

The Recommended Treatment

* This basic condition is correctable, however. The situation fortunately is not complicated by an increasing school population. Given a reasonable level of cooperation among responsible agencies and institutions, and given a broad base of public support, the necessary steps can be taken to correct the basic condition in as few as eight years.
* To do so, however, several crucial steps must be taken and accomplished. These are:
  * Every public school pupil must come to reside in an accredited twelve-grade district, preferably a Type I, twelve grade State-accredited district. This step should be accomplished at the earliest opportunity even if it should require special legislation before the next regular session of the Legislature.
  * The level of support for normal and annual recurring costs of education must be raised—in gradual annual increments—from its present level of $426.62 per pupil to an estimated $502.12 by 1975.

NEW PERSONNEL PROGRAM

* The higher level of support will enable properly organized local districts to place a qualified teacher in every classroom and to employ on the average one full-time teacher for every 25 students enrolled. It will also enable local districts to employ the needed number of qualified administrators, counselors, librarians, teachers of special education, and curriculum and supervisory personnel. At the new level of support, every district in the State, by 1975, would be enabled to provide a

minimum but adequate elementary school and high school program, thereby increasing the levels of achievement for its pupils.

* In a new program designed specifically for the purpose, the colleges and universities should prepare an appropriate number of a new kind of elementary school teacher. Graduates of the new program should be employed as instructional teams by the schools that now employ non-degree teachers. A majority of the present non-degree teachers should be enabled to enter the new preparation program at that time, so that they too may qualify themselves to resume their teaching careers.

NEW FOUNDATION PROGRAM

* The State and local school governments should form a partnership to provide a new Foundation Program for the normal and recurring annual costs of education. The key provisions of the new Foundation Program are:
  * Local district participation shall be limited annually to a deductible millage that leaves substantial local leeway—in terms of present tax levies—to introduce needed educational innovations into its programs.
  * State financial assistance shall be allocated to local districts directly in proportion to the number of full-time qualified teachers each district employs, at an average classroom ratio of 25 pupils per full-time qualified teacher.
  * Increased State financial assistance (over levels of support paid in the year preceding the introduction of the new program) shall be contingent upon a district's entry into or formation of a Type I, State-accredited twelve-grade district.
* The State Government should assume total responsibility for the extraordinary costs of education, as soon as the State is comprised principally of Type I, twelve-grade districts. These extraordinary costs include:
  * School transportation services.
  * Local indebtedness for school construction.
  * Needed future school facilities (including acquisition and and improvement of land, building construction, and purchase of equipment), in an amount equivalent to at least $20 per year per enrolled pupil.
  * Special service programs for an estimated 10% of the State's children who may continue to live in relatively isolated areas, hence cannot be served at normal costs by the regular school program of the Type I district in which they may ultimately reside.

REGIONAL SERVICE CENTERS

* The leadership role and responsibilities of the State Department of Public Instruction should be extended and further focused, through a network of regional service centers; these centers shall:

- Energize and facilitate the orderly reorganization of local districts on a regional basis.
- Encourage and support the development of shared service programs among Type I local districts, especially in the areas of: special education; the use of instructional media; and the development and dissemination of appropriate new instructional materials.
- Assess needs and develop appropriate new programs—cooperatively with the Type I districts—for the geographically isolated pupils who cannot adequately be served by regular programs.
- Assist properly organized districts to develop feasible plans to upgrade the preparation and competence of their professional personnel, and to introduce needed instructional innovations.
- Cooperate closely with the preparatory institutions and Type I districts in facilitating the development, placement, and retention of qualified instructional teams in each of the State's local districts.

* The responsibilities of the Department of Public Instruction should be extended further to:
  - Administer the new Foundation Program judiciously, in accordance with proposed policies related to district organization and employment of qualified instructional personnel.
  - Administer—or develop appropriate other mechanisms to do so—special assistance programs that cover the extraordinary costs of transportation, debt service, and capital expansion in Type I districts.

RECOMMENDATIONS

* To the State Legislature

* At the earliest possible opportunity, declare it to be public policy in North Dakota that—by 1969—every locality in the State, no matter how remote or isolated, shall be contained within the limits of a State-accredited twelve-grade school district; the Legislature should further declare, as a matter of public policy, that—not later than 1975 —every district shall attain the status of a Type I, State accredited twelve-grade district.
* Encourage and enable the State Department of Public Instruction to establish regional service centers throughout the State. These centers shall energize and facilitate appropriate local self-study of reorganization problems, and shall review and approve local district plans for reorganization as Type I districts.
* Enable the State Government through the Department of Public Instruction to assume primary responsibility for funding the extraordinary costs of education in the State; modify present laws as necessary for this purpose. If necessary, authorize establishment of an appropriate "bank" or fund (a) to refinance current debt of appropriately reorganized districts, and (b) to administer all bonds issued for future construction of school facilities at a rate prescribed by the Legislature.
* Enable State Government, through the Department of Public Instruction, to develop and administer an appropriate new Foundation Program; modify present law as required. A key provision of the new Foundation Program is that local districts shall receive support from State funds in direct proportion to the number of qualified instructional personnel the districts employ.
* Modify existing legislation to rescind the life Certificate of presently employed non-degree teachers; after 1969, that certificate should not be deemed acceptable as a sufficient credential for continued teaching in the public schools. Simultaneously, provide encouragement and incentives for present life certificated but non-degree personnel to qualify themselves within 3-5 years for continued teaching.

* To the State Department of Public Instruction

* Establish a central planning and evaluation component within the State Department of Public Instruction. Direct that component to continue to refine, evaluate, and modify the comprehensive, statewide plan that was produced by the Statewide Study of Education.
* Establish six or seven regional educational service centers within the State as extensions of the State agency's planning and evaluation components. Initially, each regional center should:

- Engage local school districts within its region in a coordinated program of self-study, leading to local district plans for reorganization as Type I districts as early as 1969.
- Review locally initiated proposals for reorganization. If the proposals constitute a sensible and feasible plan of organization within the region and for the State as a whole, approve them.
- Together with the appropriately organized twelve-grade districts: assess the needs for special educational services to pupils who reside in isolated portions of those districts; and develop and/or support appropriate programs for these pupils.
- Together with twelve-grade districts: assess present and possible future patterns of school transportation in each region; and develop economical region-wide and statewide plans of transportation services to be supported directly from State funds.
- Cooperatively with twelve-grade districts: assess their needs for future land acquisition and school construction; and develop appropriate regional and statewide plans for providing future school facilities.
- Assess needs and possibilities for shared service programs among Type I districts in each region, with particular emphasis upon special education, instructional media, and the development and dissemination of appropriate new instructional materials.
- Cooperate intimately with the State's colleges and universities in the development and implementation of their innovative new programs of personnel development and placement.

- Reorganize the Department itself in ways designed effectively to administer the proposed new Foundation Program and extraordinary services programs (i.e., transportation, capital expansion, and isolated area service).
- Reexamine in detail all recommendations of the Statewide Study; specifically, identify all implications that affect the scope, type, and intensity of professional services to be provided by the State agency during the period 1967 through 1975.
- Introduce a system of single fund accounting that is consistent with the simplicity of the new Foundation Program; abandon at the earliest opportunity the series of special funds that now complicate the pattern of State and local financial accounting.
- Cooperatively with Type I districts, introduce a system of budget and program analysis that will enable responsible bodies at both local and State levels to monitor and evaluate the new pattern of public expenditure on semestral and annual bases, consistently with their needs for program and budget planning.

* To the University of North Dakota

* Develop and initiate experimentally a new graduate program for elementary teachers that emphasizes the clinical aspects of teaching. The initial and continuing enrollment in the program should be 300 annually, so that the University may produce 800 graduates between 1968 and 1975. Graduates should be placed where most needed.

* Create an autonomous new school of behavioral science within the University to develop and conduct the experimental program, beginning in January, 1968.

* Undertake formal agreements with cooperating school districts. Assign instructional teams of newly prepared and qualified teachers to those districts; in return, an equal number of interested non-degree teachers from those districts should enroll as degree candidates in the preparation programs at levels appropriate to their prior training and experience.

* Within cooperating districts' schools, provide a resident clinical experience for each instructional team. Incorporate that clinical experience into an appropriate masters degree program; thereby, induce prospective college graduates to accept assignment as members of instructional teams in locations now populated principally by non-degree teachers.

* Assign a qualified clinic professor to each regional service center established by the Department of Public Instruction; these professors should supervise the clinical practice of the instructional teams in the center's region, and should consult with cooperating districts on problems of instructional innovation and improvement.

* At program onset, enroll up to 15 doctoral candidates in a program designed to prepare them to emulate the experimental program when they accept positions in other colleges and universities of North Dakota.

* Recruit a substantial proportion of the doctoral candidates from among qualified professors in the North Dakota State colleges; thereby, assist each such college further to develop the faculty capacity to initiate similar programs by 1970.

* Create and conduct a continuing program of Statewide analysis and evaluation activities; thereby, determine the effectiveness of the new preparation program, both within the University itself and in the cooperating school districts.

* Intensify the regular graduate level programs in education at the University in order to produce needed numbers of qualified educational service personnel by 1975; these include superintendents, elementary and secondary principals and supervisors, teachers of special education, counselors, and librarians. For 1975, a specific target of the State's colleges of education should be to enable up to 50% of the State's high school teachers to complete appropriate masters degree programs.

* To the North Dakota State Colleges

* Coordinate efforts with the University of North Dakota; initiate an appropriate new elementary teacher training program in each college by 1970.
* Undertake to prepare, to graduate at the 5th year level, and to place in suitable North Dakota school districts no fewer than 1,150 elementary teachers by 1975.
* Develop a pattern of relationships with local school districts, emulating the pilot program conducted at the University during the period 1968-1970.
* Assign 5th year students of the new program as members of instructional teams. Assign instructional teams to displace non-degree teachers in local districts, so that a proportionate number of interested and academically qualified non-degree teachers within those districts will return to the college for advanced preparation.
* Develop and assign clinic professors of education to the regional service centers of the State Department of Public Instruction. The number of clinic professors must be sufficient to supervise clinical work of the instructional teams placed by the State colleges in school districts within the regions.
* Create an appropriate unit within each participating college to develop and conduct the new program; wherever possible profit by the experience obtained by the University in its pilot endeavors of 1968 and 1969.
* Select qualified behavioral scientists and other professors who require doctoral or post-doctoral experience, and who are otherwise interested; assign them to participate in the pilot program conducted by the University, while they complete requirements for advanced graduate degrees.

* To Local School Districts

* Review seriously (a) the proposed new State Foundation Program and (b) college and university programs to qualify presently unqualified personnel.
* Initiate appropriate self-study activities; do so in cooperation with the regional service centers of the State Department of Public Instruction.
* Participate in the formulation of regional plans for local district reorganization, leading by 1975 to the establishment exclusively of Type I, twelve-grade districts in the State.
* To eliminate deficiencies among personnel, join with the University and State colleges in the proposed plan of personnel displacement: qualified instructional teams will serve in each district; at the same time, certain of the district's non-degree teachers will return to the University or State college to complete their formal preparation.
* To secure financial support for the personnel development

and deployment program, make full use of the district's allocations of funds under provisions of Title I and Title III of the Elementary and Secondary Education Act of 1964.

* Specifically, to support the clinic professor program in the district, join with the University or college and Department of Public Instruction in securing funds under provisions of Title III.

* Similarly, to support the honoraria of instructional teams assigned in the district, join with the college or University and the Department of Public Instruction in securing funds under provisions of Title I.

* Some non-degree teachers will leave the district, in order to enroll in the University's or State college's new preparation programs; their departure will (a) free a sum of money in the district budget and (b) create open teaching positions. The University or college will send instructional teams into the district, thereby—in effect—filling the open positions. The money that corresponded to the teaching positions (on the average, $4,600 per position) should be used in two ways: (a) with $3,000 of each salary, provide a nine-month fellowship to enable the non-degree teacher to return to college; (b) provide the remaining $1,600 to the college or University, in order to meet the extraordinary costs of the entire personnel preparation program.

FINANCING THE NEW STATE PROGRAM

* The New Foundation Program

* The new Foundation Program is designed to insure that each pupil enrolled in the public schools will have access to a program of educational services which meets at least minimum standards of adequacy.

* Specifically, the Foundation Program guarantees each Type I, twelve-grade district the financial resources needed to provide the following levels of services:

  * A qualified **teacher** in every classroom, at an average ratio of 25 pupils per full-time teacher.

  * Without excessive local effort, the district thereby will be enabled to maintain an average **pupil-teacher** ratio of 1:22 in grades 9-12, and 1:27 in grades 1-8.

  * A qualified **administrator** for each 12 qualified full-time teachers.

  * A qualified **instructional supervisor** for each 24 qualified full-time teachers.

  * A qualified **librarian** for each 500 enrolled pupils.

  * **Research, planning, and evaluation services,** equivalent

  * A **secretary** (or other para-professional) for each 6 qualified full-time teachers.

  * **Special education services** for an estimated 5% of enrollment, in an amount equivalent to one and one-half times the cost per pupil for regular instructional services.

  * **Research, planning, and evaluation services,** equivalent to approximately 1% of current annual expenditure.

  * **Professional in-service education programs** equivalent to $5 per pupil per year.

  * **Health, recreational, and relevant community services,** equivalent to $5 per pupil per year.

  * **Plant maintenance and operation,** equivalent to 12% of annual current expenditure.

  * **Fixed charges,** including teacher retirement and/or social security, equivalent to 8% of personnel salaries.

  * **Capital expenditures** for minor, recurring items (exclusive of bonded indebtedness), equivalent to 4% of current expenditure.

* Assume an average salary of $6,600 for a qualified full-time teacher. In 1975, when every teacher in the State is qualified, the Foundation Program is estimated to cost approximately $502 per pupil, exclusive of transportation, debt service, and capital improvement.

  * At present, however, most elementary teachers in the State are not qualified, and are not paid at the $6,600

level. Hence, the amount of money to be invested per pupil is reduced proportionately to the number of non-degree teachers employed.

* By 1975, the average support per classroom unit (i.e., 25 pupils, a qualified teacher, and **pro rata** shares of all supporting personnel and services) is estimated to be approximately $12,542 per full-time qualified teacher.
* For a classroom unit that involves an unqualified non-degree teacher the average support is reduced proportionately; it is estimated to be $8,551. The allocation per non-degree teacher unit is approximately two-thirds that for the unit per qualified teacher.
* When these differing levels of support are combined in proportion to the number of qualified and non-qualified teachers in service, the average level of support is reduced from $502 per pupil (as it would be if all teachers were qualified) to $428 per pupil, or about the 1965-66 level of support.
* The difference is this: State funds in support of the Foundation Program are used to reward local districts that are reasonably organized, and that employ qualified instructional personnel. Children are penalized now if they attend school in districts that are not organized reasonably and/or that employ unqualified non-degree instructors, because such districts typically provide inadequate educational opportunities. These children will not be penalized any further by the recommended method of State support; their districts simply will not be supplied additional funds to be spent unsuitably on high cost, ineffective programs.
* Local districts bear the responsibility to determine and provide appropriate programs for their pupils. That responsibility is in no way abrogated by this new procedure. Local districts still retain—under policies established by the State Legislature—full responsibility for curriculum and for instructional services. The State, however, will not continue under the proposed program to subsidize indiscriminately those districts (1) that persist in conducting unnecessarily high cost operations, and/or (2) that rely heavily or principally upon non-degree teachers for instruction.

* Funding the New Foundation Program

* Revenues from local, county, State, and Federal sources will be employed in support of the basic Foundation Program.
* The local share in the program will be established each biennium by the State Legislature at a level that is designed (1) to produce a fair local share in support of the program and (2) to free sufficient millage in order that local districts may—on their own initiative—provide instructional services beyond and above the minimum foundation level.

* The initial level of local participation recommended by the Statewide Study Team for 1969 is 46.5 mills: approximately 11 mills lower than the 1965-66 average. On present valuations of local property, 46.5 mills would produce approximately $32 millions; that sum represents about 50% of the normal, recurring costs of school operation, exclusive of transportation and capital expansion.

* A local participation millage of 46.5 will free approximately 11 mills from present statewide average local levies for all costs of education. The 11 mills represent about $7.6 millions annually; that sum might then be invested by school districts to extend and/or improve basic educational programs. For example: local districts could introduce kindergartens, to enroll 12,500 five year olds; the cost is estimated to be no more than $3.5 millions, when fully qualified kindergarten teachers are employed.

* The State would then provide the difference between (a) the estimated total cost of the basic Foundation Program and (b) the local contribution based on 46.5 mills. Funds for this purpose would be derived from State sales revenues, county property levies, and from varied Federal programs. Once the minimum program is established at an appropriate level, any additional increases in Federal allocation to the State for education could be used to enrich the Foundation Program, or to support other aspects of education or both.

* Were the Foundation Program to be introduced in 1969, the costs to the State are estimated to be as shown on the following page.

* Funding Extraordinary Cost of Education

* The use of a participating millage (e.g., 46.5 mills, as recommended) tends to equalize the contributions to education from districts whose present property valuations are unequal.

* To further equalize educational support in the State, and to absorb the extraordinary costs now borne by local districts for transportation, capital expansion, and sparsity of population, it is recommended that the State assume all such costs in those districts that qualify as Type I, twelve-grade districts by 1969.

* The object of this policy is two-fold:

  (1) to spread the costs of essential non-instructional services (which now are borne unequally among the local districts) on the broadest possible base of support—and the Statewide base is the broadest base available;

  (2) to provide appropriate financial incentives for local districts to reorganize themselves into Type I, twelve-grade districts for optimal financial and program efficiency.

PROJECTED DETAILS OF BASIC FOUNDATION PROGRAMS

	1969	1970	1971	1972	1973	1974	1975	1980
Projected Enrollment	142,931	142,573	142,117	141,729	140,520	139,297	139,660	143,070
Classroom Units (25:1)	5,717	5,703	5,685	5,669	5,621	5,572	5,586	5,723
Qualified Teachers	3,414	3,681	3,970	4,420	4,738	5,250	5,586	5,723
Non-Qualified Teachers*	2,303	2,022	1,715	1,249	883	322	..	..
Basic Support Levels			(millions of dollars)					
$12,542/Qualified Teacher Unit	42.8	46.2	49.8	55.4	59.4	65.9	70.1	71.8
$8,551/Non-Qualified Teacher Unit	19.7	17.3	14.7	10.7	7.5	2.7	..	..
TOTAL Cost of Program**	62.5	63.5	64.5	66.1	66.9	68.6	70.1	71.8
Local Share (at 46.5 mills)	32.0	32.0	32.0	32.0	32.0	32.0	32.0	32.0
COST TO STATE GOVERNMENT (from County, State, and Federal Sources)	30.5	31.5	32.5	34.1	33.9	34.6	38.1	39.8
Local Tax Leeway (at 11 mills)	7.6	7.6	7.6	7.6	7.6	7.6	7.6	7.6

*The reduction between 1969 and 1975 in non-qualified teachers presented here assumes that the State will mount in 1968 a new program to qualify elementary teachers, and will pursue that program vigorously through 1975 until every elementary teacher in the State is fully qualified.

**Assuming the recommended pattern of district organization.

* Specifically, for Type I districts, it is recommended that the State assume the costs of transportation services, payments on prior debt for school construction, and the costs of needed future construction.
* The cost to the State is estimated to be as follows:
  * **Transportation services:** approximately $43.38 per pupil, or an average annual expenditure of about $6.2 millions. Transportation expenses will increase following reorganization, to be sure. The maximum estimated cost is approximately $2.2 millions annually.
  * **Service on prior indebtedness for construction:** approximately $51 per pupil, or $7.25 millions annually until present indebtedness is retired.
  * **Future construction:** approximately $20 per pupil per year, or $2.8 millions annually. An annual appropriation in this amount would be made; however, the funds would be expended only as required to service bonds for needed new construction.
  * The **estimated total cost** to the State is approximately $10.1 millions.
* In order to provide essential services to rural isolated pupils, the State also would guarantee an annual appropriation for this purpose. Funds would be provided for each isolated pupil in an amount equal to one and one-half times the standard amount per pupil in the Type I, twelve-grade districts. The total cost of services for isolated pupils is estimated on the assumption that up to 10 percent of the high school population will require such services. The average annual cost for such services would be approximately $1.3 millions.
* The new Foundation Program is designed to gain maximum utilization of the State's limited resources for education. The estimates of expenditures required for all basic educational services project an aggregate increase between 1960 and 1980 of approximately $10 millions, a rate considerably below past State performance. Adjustments in these estimates will be required, however, to compensate for inflation and increases in cost of living that might occur during this period.
* Total estimated costs of the basic Foundation Program and supplementary State service for transportation, debt service, capital expansion, and isolated areas programs are sumarized in the following table.
* The projected costs seem well in line with the State's limitations of resources. The combined State and Federal investment in education in 1966 was 40.6 millions. In 1967, an aggregate biennial appropriation was made that extended State support by $11 millions to approximately $51.6 millions. The proposed new program begins in 1969 at a level less than the presently anticipated 1968 level of expenditure.
* However, it should be remembered that the new Foundation

PROJECTED TOTAL COSTS OF ELEMENTARY AND SECONDARY EDUCATION: 1969-1980

(In 1966 Dollars)

	1969	1970	1971	1972	1973	1974	1975	1980
Projected Enrollment	142,931	142,573	142,117	141,729	140,520	139,297	139,660	143,070
Classroom Units	5,717	5,703	5,685	5,669	5,621	5,572	5,586	5,723
Qualified Teachers	3,414	3 681	3,970	4,420	4,738	5,250	5,586	5,723
Non-Qualified Teachers	2,303	2,022	1,715	1,249	883	322	..	..
				(millions of dollars)				
COST OF BASIC PROGRAM	62.5	63.5	64.5	66.1	66.9	68.6	70.1	71.8
Local Share (at 46.5 mills on 1966 valuation)	32.0	32.0	32.0	32.0	32.0	32.0	32.0	32.0
State Share of Basic Program	30.5	31.5	32.5	34.1	34.9	36.6	38.1	39.8
State Share Transportation*	6.2	6.2	6.2	6.1	6.1	6.0	6.0	6.2
Service on Prior Debt	7.3	7.3	7.3	7.3	7.3	7.3	7.3	7.3
Future Construction (at $20/pupil)	2.8	2.8	2.8	2.8	2.8	2.8	2.8	2.8
Rural Isolation Factor	1.2	1.3	1.3	1.3	1.3	1.3	1.3	1.3
Administration (at 4% of State appropriation)	1.9	2.0	2.0	2.0	2.1	2.2	2.2	2.3
TOTAL STATE SHARE (exclusive of personnel development program)	49.9	51.1	52.1	53.6	54.5	55.2	57.7	59.7
Local Leeway for Program Improvements	7.6	7.6	7.6	7.6	7.6	7.6	7.6	7.6

*Plus a maximum of $2.2 millions once districts are totally reorganized.

Program is not only a plan of public expenditure; principally it is a plan for district reorganization and personnel development. The economies envisioned here cannot be realized until every pupil in the State is enrolled in a Type I, twelve-grade accredited district. No significant improvements in elementary education can be realized until qualified teachers are employed in all elementary classrooms. No real improvements in high school programs can be attained until sufficient students can be enrolled in each school to support a minimum of 12-13 full-time teachers and the appropriate administrative and educational service personnel.

* The recommended Foundation Program, together with the recommendations for personnel development and for State support of extraordinary costs of education, constitute a single proposal. Each element of the proposal is so dependent for success upon the other that only as a coordinate whole will the comprehensive plan work to the State's advantage.
* With all plans fully implemented by 1975, the State will have attained these educational and economic advantages:
  * Every pupil will be instructed by a qualified teacher and supported by adequate educational materials and services. Higher academic achievement will follow directly from this.
  * Every district in the State will enroll no fewer than 200 pupils in the upper four grades, the smallest unit justifiable on economic and educational grounds.
  * State and local funds will be conserved, permitting the State to invest new funds into needed programs of higher education and related State programs.
  * Local districts will have sufficient tax leeway to enable them to extend educational services to kindergartners, and to enrich local programs beyond the level of the basic foundation program.

* Funding the Personnel Development Program

* Reorganization alone will not solve the basic educational problems of the State. Qualified educational personnel must be prepared. Moreover, they must be placed where they are most needed, namely: in the relatively small school district.
* In order to place qualified educational personnel in every reorganized school district in the State, the State colleges and universities must take appropriate initiative to prepare these new numbers of personnel by 1975.

Elementary teachers (at M.A. level)	1,950
Special Education Teachers (Elementary)	199
Special Education Teachers (Secondary)	85
Secondary Teachers (at M.A. level)	1,574
High School Counselors (at M.A. level)	92

School Librarians (at M.A. level)	284
Elementary Principals & Supervisors (at M.A. level)	259
Elementary Principals & Supervisors (at post-masters level)	68
High School Principals & Supervisors (at post-masters level)	109
General Administrators (at post-masters level)	221
General Administrators (at doctoral level)	15
State Education Agency Planning Personnel (at post-masters level)	24
University Professors (for clinic schools)	25
University Professors (for behavioral sciences and related fields)	36

* The most crucial need is to mount in 1968 a new program for elementary teachers. This is most readily accomplished in two steps: a pilot project at the University of North Dakota, beginning in January, 1968, followed by similar projects in the State colleges in the Fall, 1970.
* The regular on-going preparation programs for other educational personnel will need to be intensified, with particular emphasis upon summer institutes and off-campus externship programs.
* To mount the pilot elementary teacher training programs at the University of North Dakota by January, 1968, funds will have to be obtained from the Federal Government.
* To continue the University program after 1971, and to initiate and sustain the program in the State colleges beginning in 1969, the State will have to provide modest special appropriations over and above the regular budgets for higher education.
* The University proposes to seek a total of $1,500,000 from the U.S. Office of Education to cover the costs of developing and operating the pilot program during its first three and one-half years. Beginning in 1972, the University will require modest additional appropriations from the State to sustain its program through 1975.
* The State colleges will be urged to undertake the elementary teacher training program in 1970. They will require a special appropriation of $200,000 from the State in 1969 to enable them to plan and develop their programs. Subsequently, modest additional appropriations will be required to sustain their programs.
* The greatest proportion of funds to support the elementary training program will be derived not from the State but from the local districts themselves: that is, from their entitlements under Title I and Title III of the Elementary and Secondary Education Act of 1965, and from salaries of non-degree teachers who return to the colleges and universities on fellowships for advanced preparation.
* Legislative appropriations required for the elementary teacher preparation program should begin in 1969 at the

ESTIMATED COSTS TO PREPARE 1,950 NEEDED ELEMENTARY TEACHERS: 1968 - 1975

(In Thousands of 1966-67 Dollars)

PROGRAM ELEMENTS	1968	1969	1970	1971	1972	1973	1974	1975
A. To develop, manage, analyze, evaluate, and disseminate new program: University of North Dakota[1]	414	757	739	756	740	757	740	756
B. To develop and operate program in State colleges		200	604	994	1,084	1,165	1,122	1,036
C. Total Operating Costs	414	957	1,342	1,750	1,824	1,921	1,862	1,792
SOURCES OF FUNDS								
A. Local and Federal Contributions[2]	414	757	967	1,446	1,038	1,127	1,248	1,178
B. Needed Special State Appropriation		200	375	304	786	794	614	614[3]
C. Self-supporting Fellowships for 1,950 Teachers	190	660	660	1,980	1,980	2,145	2,475	2,310

[1]Includes the preparation of 15 new college professors to assist State colleges in developing special elementary teacher program.

[2]Federal funds include those from Title I and Title III, ESEA; local contributions include payments in lieu of non-degree teacher salaries, and regular student tuition and fees.

[3]After 1975, the continuing cost to prepare needed elementary teachers at this level may be integrated into the regular higher education budget.

level of $200,000; the need approaches $800,000 by 1972, then declines to $615,000 in 1974 and 1975. After 1975, the elementary training program will be operated only on a replacement basis, hence the costs to the State for the program then may be integrated into the regular higher education budget. Until 1976, however, the funds for elementary teacher development must be appropriated over and above the regular higher education budget.

* The estimated costs of the proposed elementary preparation program, beginning with the pilot program at the University of North Dakota in 1968, are summarized in the following table. The unit cost of the program to produce 1,950 elementary teachers at the masters degree level and 15 higher education professors is estimated to be less than $5,500 per graduate.

* Total Estimated Cost to State of All Programs

* The proposed new pattern of public expenditure includes expenditures for these basic educational developments:
  * A new basic and comprehensive Foundation Program of educational services.
  * State support for the extraordinary costs of transportation, debt service, capital expansion, and isolation.
  * A new personnel development program that will qualify every teacher in the State by 1975.
  * An expanded role for the State Department of Public Instruction through seven regional service centers.
* The total cost to the State for the proposed program, beginning in 1969, is $49.9 millions, approximately the amount that the State-Federal contribution would normally expend at present rates of support. The estimated cost in 1975 is $48.8 millions, and in 1980, $59.7 millions (discounting inflation and cost of living increases).
* It should be clear, therefore, that the State can afford the proposed new program. Indeed, if it wishes seriously to conserve its modest financial resources, it cannot afford to continue under its present system. The new proposal provides an attractive and feasible alternative.
* The proposed new program, however, requires that the State reorganize its local districts by 1975 so that every pupil will be enrolled in a Type I, twelve-grade accredited district on or before that year. It further requires that State funds be expended directly in proportion to the number of qualified personnel local districts employ.
* A summary of estimated total cost to the State to correct its basic education condition by 1975 is presented in the following table.

ESTIMATED COSTS TO THE STATE FOR EDUCATIONAL IMPROVEMENT: 1969 - 1980
(In millions of 1966-67 dollars)

PROGRAM ELEMENT	1969	1970	1971	1972	1973	1974	1975	1980
Basic Foundation Program	62.5	63.4	64.4	66.1	67.0	68.6	70.1	71.8
Transportation Program[a]	6.2	6.2	6.2	6.1	6.1	6.0	6.0	6.2
Debt Service Program[b]	7.2	7.2	7.2	7.2	7.2	7.2	7.2	7.2
Future Expansion Program[c]	2.8	2.8	2.8	2.8	2.8	2.8	2.8	2.8
Local District Share[d]	32.0	32.0	32.0	32.0	32.0	32.0	32.0	32.0
Estimated State Share	46.8	47.7	48.7	50.3	51.1	52.7	54.2	56.1
Estimated cost per pupil for all educational services (dollars)	(551)	(559)	(568)	(581)	(592)	(608)	(617)	(616)
State Department of Public Instruction								
Isolated Area Services	1.2	1.2	1.3	1.3	1.3	1.3	1.3	1.2
Regional Service Programs	Funded from Title III and Title V. (ESEA)							
Administration of State Programs[e]	1.9	2.0	2.0	2.0	2.1	2.2	2.2	2.2
Special Personnel Development Program[f]	0.2	0.4	0.3	0.8	0.8	0.6	0.6	0.0
TOTAL COST TO STATE	50.1	51.3	52.3	54.4	56.3	56.8	58.3	59.6
Local Funds Available for Instruction Improvement[g]	7.6	7.6	7.6	7.6	7.6	7.6	7.6	7.6

Explanatory footnotes on succeeding page

FOOTNOTES

[a] Based on allowance of $43.38 per enrolled pupil. An additional $2.2 millions may be needed to facilitate total reorganization of local districts into Type I, twelve-grade accredited districts.

[b] Debt service is projected from the 1965-66 level of local district payments for principal and interest on bonded indebtedness, and for payments into their sinking and interest funds. The amount allocated ($7.2 millions annually) will be reduced each year as indebtedness is retired. It is reasonable to expect that an annual allocation of $7.2 millions no longer will be required after 1975, or throughout the period of 1969 and 1975.

[c] An allocation equivalent to $20 per enrolled pupil is recommended each year to underwrite the cost of future indebtedness for school construction. The amount allocated will secure $15,000 per classroom unit, an allocation sufficient to guarantee a safe and sanitary facility for each child.

[d] Local district share is based upon a participation millage of 46.5 levied against 1966 valuation of $688,267,515. Participation millage levels are adjusted each biennium in accordance with needs. If local property valuations are increased, the participation millage requirement may be reduced; it may also be maintained or increased, depending upon revenue requirements and the level of services desired in the Foundation Program.

[e] An allocation not to exceed 4% of total State allocation to elementary and secondary education is made to administer the State Foundation Program and related service programs. Funds available to the State education agency for the administration of Federal programs might be deducted from this basic allocation in any given year.

[f] This program is almost exclusively funded from Federal and local district contributions. The State's role, however, is crucial in order to sustain the program throughout the period in which the State endeavors to qualify all of its elementary school teachers. The allocation from the State should be over and above the regular budget to higher education, since the State colleges and universities cannot absorb the extraordinary costs of this program without special assistance.

[g] When the participation millage for local districts is set at 46.5, approximately 11 mills are freed from curent average millage levies in the State. These 11 mills represent $7.6 millions of local leeway to institute new programs (e.g., public kindergartens) or to enrich the quality of services locally above and beyond the minimum foundation program.

THE STATEWIDE STUDY OF EDUCATION

The published materials of the Statewide Study of Education are reproduced in six volumes. These are:

* PERSONNEL NEEDS IN NORTH DAKOTA PUBLIC SCHOOL
* PUBLIC EXPENDITURE FOR EDUCATION IN NORTH DAKOTA
* EDUCATIONAL DEVELOPMENT FOR NORTH DAKOTA 1967-1975: OVERVIEW
* DEVELOPING AND PLACING EDUCATIONAL PERSONNEL IN NORTH DAKOTA
* A PLAN OF PUBLIC EXPENDITURE FOR EDUCATION IN NORTH DAKOTA
* DEVELOPING STATE LEADERSHIP FOR EDUCATION IN NORTH DAKOTA

Copies of these documents are available through the Office of the State Superintendent of Public Instruction, State Capitol, Bismarck, North Dakota.